Comparisons of Job Characteristics

Focus Occupation: Plumbers, Pipefitters, and Steamfitters (47-2152)

Associated Occupation: Welding, Soldering, and Brazing Machine Setters, Operators, and

Tenders (51-4122)

Compare Knowledge
Compare Skills
Compare Abilities
Compare Detailed Work Activities
Compare Tools and Technologies

<<	Focus occupation element is much lower
<	Focus occupation element is lower
0	Focus occupation element is at a similar level
>	Focus occupation element is at a higher level
>>	Focus occupation element is at a much higher level

80

Knowledge

Similarity of Focus Occupation to Associated Occupation: 54

Focus Occupation: Plumbers, Pipefitters, and Steamfitters (47-2152)

Associated Occupation: Welding, Soldering, and Brazing Machine Setters, Operators, and Tenders (51-4122)

Associated Occupation's Key Knowledge Elements	Average Rating, All Occupations	Associated Occupation's Rating	Focus Occupation's Rating	Evaluation of Focus Occupation	
Mechanical	6.8	12.2	17.0	>>	Current knowledge level is likely more than sufficient
Production and Processing	6.0	11.6	6.2	<<	Extensive education and/or training may be required
Public Safety and Security	6.9	8.0	7.1	<	Expanded education and/or training may be required

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

Skills

Similarity of Focus Occupation to Associated Occupation:

Focus Occupation: Plumbers, Pipefitters, and Steamfitters (47-2152)

Associated Occupation: Welding, Soldering, and Brazing Machine Setters, Operators, and Tenders (51-4122)

Associated Occupation's Key Skills Elements	Average Rating, All Occupations		Focus Occupation's Rating	Evaluation of Focus Occupation
Operation Monitoring	6.6	9.6	9.6	Current skill level may be sufficient
Operation and Control	5.4	8.6	8.7	Current skill level may be sufficient

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

Abilities

Similarity of Focus Occupation to Associated Occupation: 87

Focus Occupation: Plumbers, Pipefitters, and Steamfitters (47-2152)

Associated Occupation: Welding, Soldering, and Brazing Machine Setters, Operators, and Tenders (51-4122)

Associated Occupation's Key Abilities Elements	Average Rating, All Occupations	Associated Occupation's Rating	Focus Occupation's Rating	Evaluation of Focus Occupation	
Manual Dexterity	6.5	9.7	10.6	0	Current ability level may be sufficient
Control Precision	6.6	9.6	11.2	>	Current ability level is likely sufficient
Finger Dexterity	7.6	9.6	11.1	>	Current ability level is likely sufficient
Auditory Attention	5.9	7.9	6.9	<	Some improvement in abilities may be required
Extent Flexibility	4.8	7.9	11.5	>>	Current ability level is likely more than sufficient
Reaction Time	4.8	7.3	8.6	>	Current ability level is likely sufficient
Rate Control	3.8	7.2	5.5	<	Some improvement in abilities may be required

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

Activities that Both Occupations Have in Common

Similarity of Focus
Occupation to Associated
Occupation: 76

Focus Occupation: Plumbers, Pipefitters, and Steamfitters (47-2152)
Associated Occupation: Welding, Soldering, and Brazing Machine Setters, Operators, and Tenders (51-4122)

Work Activities	Exclusivity of Activity
Braze metal parts or components together	85
Clean equipment or machinery	20
Examine products or work to verify conformance to specifications	15
Fabricate, assemble, or disassemble manufactured products by hand	11
Move or fit heavy objects	8
Read blueprints	10
Read specifications	23
Read technical drawings	7
Solder metal parts or components together	73
Use acetylene welding/cutting torch	54
Use hand or power tools	2
Weld together metal parts, components, or structures	54

Not all positions in these occupations will necessarily perform all of the listed activities. The exclusivity rating is an indication of how unique the activity is amongst all occupations. The maximum rating is 100. High scores indicate that only a small number of occupations engage in that activity.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

Tools and Technologies that Both Occupations Have in Common

Similarity of Focus
Occupation to Associated
Occupation: 77

Focus Occupation: Plumbers, Pipefitters, and Steamfitters (47-2152)

Associated Occupation: Welding, Soldering, and Brazing Machine Setters, Operators, and Tenders (51-4122)

Tools and Technologies Exclusivity

Computers	1
Content authoring and editing software	1
Cutting and crimping and punching tools	3
Data management and query software	1
Face and head protection	7
Forming tools	2
Holding and clamping tools	3
Industry specific software	1
Information exchange software	1
Length and thickness and distance measuring instruments	2
Lifting equipment and accessories	3
Machine tools	7
Measuring and layout tools	3
Power tools	2
Rough and finishing tools	5
Soldering and brazing and welding machinery and supplies	6
Special tooling fixtures	16

Not all positions in these occupations will necessarily use all of the listed tools and technologies. The exclusivity rating is an indication of how unique the tool or technology is amongst all occupations. The maximum rating is 100. High scores indicate that only a small number of occupations use that tool or technology.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.